REMARKS/ARGUMENTS

Claims 1, 3, and 4 were amended, and claims 2 and 12-20 were deleted. Claim 1 was amended to incorporate the subject matter of claim 2, and claims 3 and 4 were amended to correct their dependency. No new matter is added therein. In view of the foregoing amendments and the following remarks, favorable reconsideration of the present patent application is respectfully requested. Claim 1 is amended for further distinguishing the present invention from the cited reference.

Claim Rejections – 35 U.S.C. §103

Claims 1-4, 9, 11, 12-14, and 19 were rejected under Section 103(a) as being unpatentable over Ogura et al.

Ogura discloses a heat sink/circuit board assembly including the heat-generating parts 1 connected to the circuit board 2 via the terminals 1a, a main heat sink 3 having a recessed portion 3a and plate-like projections 3b, and the sub-heat sinks 4 and 6 (as shown in Fig. 3). The sub-heat sink 4 is disposed between the heat generating parts 1 and the circuit board 2 and contacts with the projection 3b of the main heat sink 3. The sub-heat sink 4 transfers the heat generated by the heat-generating parts 1 to the projections 3b, and then the projections 3b transfer the heat to the main heat sink 3.

As recited in the amended Claim 1 of the present application, the present invention discloses a heat sink assembly for use in an electrical apparatus having a printed circuit board having an electromagnetic device. The heat sink assembly includes a second heat-dissipating piece disposed on the edge of the printed circuit board and contacting the printed circuit board and the first heat-dissipating piece for transferring the heat from said first heat-dissipating piece away from the printed circuit board.

However, the cited Ogura et al. reference does not disclose such claimed invention or render it obvious. The distinctions between the cited reference and the present invention are illustrated as follows.

In the Office Action, the Examiner regards Ogura's sub-heat sink 4 as the claimed "first heat-dissipating piece" and Ogura's main heat sink plate-like projections 3b as the claimed

"second heat-dissipating piece" of the present invention. However, Ogura's plate-like projections 3b are structurally different from the second heat-dissipating piece of the present invention, since the second heat-dissipating piece is disposed on the edge of the printed circuit board and contacts the printed circuit board, but Ogura's projections 3b do not contact the circuit board.

In addition, in the present invention, the heat generated by the electromagnetic device can be effectively transferred to the case of the electrical apparatus via the first and the second heat-dissipating pieces, which reduces the heat-conduction path, and the disposition of the second heat-dissipating piece more efficiently uses the inner space of the electrical apparatus. Therefore, the present invention is distinct from and neither disclosed nor suggested by Ogura.

Regarding the rejected dependent claims, many of the features recited in these claims are neither disclosed nor suggested by Ogura. For example, the third and fourth heat-dissipating pieces recited in claims 4 and 5 are neither disclosed nor suggested by Ogura. Therefore, these claims would not have been obvious from the disclosure of Ogura et al.

The Office Action argues that it would have been obvious to integrally form Ogura's first and second heat-dissipating pieces, citing *Ex parte Masham*. Applicants respectfully disagree. The cited decision is not relevant to the present facts. In the present case, Ogura's first and second heat dissipating pieces cannot be integrally formed without rendering Ogura inoperative. If Ogura's heat dissipating pieces were integrally formed, then it would be impossible to secure Ogura's heat generating parts 1 to the sub-heat sink 4, 6, 7 as shown in Ogura's operative embodiments of Figures 3, 5, and 6. Ogura's Figure 7 is not an operative embodiment of the invention, but is a temporary circuit board testing embodiment made possible because the main heat sink and the sub-heat sinks are not integrally formed. One having ordinary skill in the art will appreciate that Ogura does not teach or suggest integrally forming the first and second heat-dissipating pieces. From the facts and circumstances of the Ogura patent, it would not have been obvious to integrally form Ogura's first and second heat-dissipating pieces, regardless of what *Ex parte Masham* states.

Claims 7, 8, and 17-20 were rejected under 35 U.S.C. 103(a) as being unpatentable over Ogura et al. in view of Jakob et al. and further in view of Saneinejad et al. However, Claims 7

and 8 should be patentable owing to their dependency from the patentable Claim 1, and Claims 17-20 have been canceled. Withdrawal of the rejection is respectfully requested.

Applicants respectfully submit that the pending claims would not have been obvious from Ogura et al. alone or combined with the teachings of the other cited references and request withdrawal of the rejections. Applicants further request that a timely Notice of Allowance be issued in this case. If there are any remaining issues preventing allowance of the pending claims that may be clarified by telephone, the Examiner is requested to call the undersigned.

Respectfully submitted,

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